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The Study of Negative Space

Schneider, Nathan

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The Study of Negative Space

Nathan Schneider

Commentary for PhD by Published Work
University of Westminster
Supervisor: Prof. Graham Meikle

This commentary introduces a body of scholarly work concerned with *the study of negative space* in media economies: a practice of understanding current realities in order to recognize the more just, equitable possibilities that do not currently prevail but nevertheless could. The work draws on diverse fields, including platform studies, theories of mediation, media archaeology, legal and corporate governance scholarship, and religious studies. These have informed a series of publications including journal articles, book chapters, and the monograph *Governable Spaces: Democratic Design for Online Life.* Research methods center on accountability through relational organizing, community-centered database development, experimental design through software prototyping, and theorizing grounded in practice. The activities described here have already begun to shape thinking in media studies and beyond, but they remain a foundation more than a capstone, and they leave room for further development in methodological rigor, breadth of practice, and diversity of imaginative resources.

Acknowledgments

complete my degree in this way, all the while welcoming me into their community.

Introduction

I have begun to admit to myself that, after long trying to do more easily explainable things, I study what lurks in the cracks between what is empirically observable—visions of a more just, more habitable world that may be potentially possible but for various reasons remains only that. I have come to think of it as *the study of negative space.*

I have written books on debates about God, a visionary protest movement, cooperative business, and everyday online politics. Over and over, I take my informants and their aspirations seriously, only to see them run aground in practice against an ill-prepared world. In a media epoch that throttles its subjects with the incandescence of the latest product, turning one's attention to the negative space of what paths could have been taken (but were not) seems an

undertaking that is both necessary and needful of scholarly discipline. Without that discipline, it is easy to get lost. To venture into negative space, after all, comes with the risk of falling forever into the expanse of that space, untethered to the real. Then again, the world is full of things that once did not exist, and then they did. To understand why what could exist does not, one has to understand deeply the world as it is.

The study of negative spaces in contemporary media economies has led me into a productive career as a media scholar—through it was not what I expected when I departed my initial academic career in religious studies a decade and a half ago. After that, I worked as a journalist, and in that guise I reported and wrote my way from religious cultures and social movements into media economies. Since coming to the University of Colorado Boulder, I have published twenty-five peer-reviewed articles and book chapters, in venues ranging from my adopted field's leading journals to law reviews and computer science proceedings. During that time I have also published my third trade book, a scholarly monograph, and three edited volumes. According to Google Scholar, my work has been cited over 1,600 times. I meanwhile built the Media Economies Design Lab (MEDLab) at CU Boulder, as well as an international research organization, Metagov, whose board I now chair.

The study of negative space begins, for me, with deep engagement with the problems people face in practice. Several times a week I meet with entrepreneurs building cooperatives and other social enterprises; I have helped build two nonprofit organizations that support them. In order to understand why the online economy has so often turned out to be extractive and oppressive, I study what happens when people try to change it—and what they are up against. The questions I try to answer in my research are the questions that emerge from their experience and the barriers they encounter. *Where do those barriers come from? Do they have to be there? What would happen if we took them down?*

In scholarship I have found a means of charting the outlines around, and pathways into, the negative spaces of possibility hiding among the present structures of power. My method has been primarily theory building, grounded in collaboration and participatory research. I have published on digital colonialism, feminist theory, legal theory, the news industry, software design, startup financing, and public policy. In the process, I test my ideas continually through practice—whether it is by building organizations that have to find pathways to sustainability or by writing code that only works if a computer will run it and users will use it.

I often recall a quip in the epilogue of a book by the eminent religion scholar Bruce Lincoln, *Theorizing Myth*. There he reflects on the difference between mythology and scholarship, at the end of a work about the peril in disguising the former as the latter. He concludes with the provocation that "scholarship is myth with footnotes" (Lincoln, 1999, p. 209). I find value in two sides of that provocation. Firstly, it suggests that scholarship can have the motivational and social power of myth; it is not merely the work of an isolated ivory tower. But, secondly, to be scholarship at all, scholarship must have the rigor and care of

citation—along with the accountability of peer review that a culture of citation implies. With concepts I have developed like "platform cooperativism," "exit to community," and "governable spaces," I think it is apt to describe my aspirations as well-cited myth-making.

In what follows, I will outline my scholarly trajectory as an exercise in the study of negative space.

First, I situate my work in a review of the major fields with which I have concerned myself. These include scholarship in the political economies of platforms—both in media studies as well as beyond it in fields such as law, policy, and corporate governance. I read the platform economy through theories of mediation, media archaeology, and digital colonialism. Religious studies has remained an ongoing source of insight as well.

I then introduce the portfolio of published work that I have submitted, along with the contributions my body of work represents. The focal point of the portfolio is the monograph *Governable Spaces: Democratic Design for Online Life*, published by University of California Press in 2024. The portfolio also includes several shorter pieces that frame my adjacent concerns around media theory and public policy.

Third, I explore in greater depth the methodological practices that I have undertaken in the study of negative space. Despite gaps in formal training due to my career's unorthodox trajectory, I have found ways to develop useful contributions, grounded especially in forms of critical, community-engaged practice. This has included the development of software prototypes, practitioner-facing databases, organizational leadership, and autoethnographic reflection. Since the study of negative space requires looking beyond what is presently the case, it is well-suited to less orthodox methodologies.

Finally, I summarize the contributions of my work so far and point to both limitations and future directions. I have been grateful to contribute to several fields of both scholarship and practice, ranging from platform studies and media archaeology to cooperative entrepreneurship and software design. But as my career continues to develop, I intend to continue deepening the rigor of my methods and broadening the sources of imagination I learn from. I am grateful to have had the chance to form the foundations of a career in media studies, and with this commentary and portfolio I hope to introduce myself more formally to the field.

Field scan

I see the academic literature as a form of accountability—a way to ground my contributions to the building of a more just world in a community of overlapping expertise. I have thus not been content to focus on a single field or subfield, even as I have made media studies my intellectual home. In the course of my return

to academia, even as the guild's public profile appears to wane, I have developed a deepening respect for scholarly exchange and disciplinary rigor. Contributing back, then, is reciprocity—necessary most of all when the enterprise is in crisis. While doing work that helps address challenges that originate outside academia, I hope to build on the academic literature in exchange for what it has taught me and to serve as an emissary for its value.

As I began making my way into media studies almost a decade ago, I developed a concern that the field centered too much on the mode of critique. I worried that the field was exhausting itself in criticisms for the intrusions of capitalism upon news and online platforms, for the representational politics of entertainment products, for the oppressive subjectivities of contemporary mediated life. I don't dispute the value of these critiques, and I learn from them. But I often feel they take on too easy a task. It is easier to criticize than to create something immune to criticism. Critique runs the risk of paying unintentional tribute to the media ecosystem that presently exists, rather than imagining and building what could otherwise be.

With more time and reading, however, I learned that I would be in good company in media studies. This is a field with ample resources for moving through critique and into seeing the alternative possibilities hidden among us—for the study of negative space. As I got to know the field better, I found conversation partners and guides for the possible worlds I wanted to explore, and I wanted to introduce them to my communities and collaborators outside the academy.

Critique is strongest, I find, when critics take the time to remember why they are doing it. My CU Boulder colleague Casey Fiesler once began a guest lecture in my class, focused on the many ethical dilemmas around social media, with a disclaimer: she criticizes the Internet because she loves it, because it helped raise her, because she is in awe of what it can be. I share that sensibility. I care about what media are and might be instead, first of all, out of an admiration for what we humans have contrived to communicate with each other, despite ourselves.

The epigraph from my book *Everything for Everyone* (Schneider, 2018b) came from the filmmaker Chris Marker: "I bow to the economic miracle, but what I want to show you are the neighborhood celebrations." Along those lines, this section reviews the literatures that have guided me most as a scholar. The economic miracles, along with their profound harms, come first. Then come the neighborhood celebrations in the form of mediation, self-governance, and religious imaginaries.

Political economies of platforms

Before I came to my position at CU Boulder, I was engaged in journalism and organizing with people trying to build a more equitable and just online economy. My focus was on the emerging projects, the people who were trying to chart a route against the dominant tides. I did my best to connect these people and even

advise them. When I arrived at the university, I realized it was an opportunity to understand better what they—what we—were up against.

One vehicle for doing this has been the development of my undergraduate course Disruptive Entrepreneurship. It centers on academic and industry conceptions of "disruption" (Christensen, 2006; Lepore, 2014), in conversation with early critiques of "Californian" startup culture (Barbrook & Cameron, 1995/1996; Hepp et al., 2023). Disruption theory is a case of unusually deep entanglement between research and corporate hype, which merge in the construction of an ideology and analysis ideally suited to support the modes of deploying investment capital among high-risk, high-reward technology companies. Although both boosters and critics of the Silicon Valley system often seek to moralize the actions of its most visible leaders, I find more instructive lessons in tracing the logic of its basic infrastructures for the flows of value and culture.

In that course and in my research, the dominant flows become all the more clear through integrating divergent narratives of Internet history, coming from perspectives that include artists (Malloy, 2016), Black user communities (McIlwain, 2019), feminists (Rankin, 2018), hackers (Coleman, 2013), social movements (Tufekci, 2017; Turner, 2010), and speculative fiction (brown & Imarisha, 2015). In addition to the course, my engagement with the entrepreneurial community in Boulder (Feld, 2012) has grounded that literature in the rites and habits of building startups in the reigning mold. A particularly important guide has been my colleague Brad Bernthal, a scholar of entrepreneurial finance at Colorado Law (Bernthal, 2019).

A major focus of my analysis has been the mechanism of venture capital, the dominant means of financing emerging technology startups. I have seen again and again how VC-backed startups can drown out alternative models and drive social values out of companies (Shestakofsky, 2024). This model did not always play the role it does today, and its centrality was not inevitable; it was intentionally crafted through entrepreneurship and policy-making (Nicholas, 2019). I frequently remind startups that I work with of this fact—that VC was created by humans, in history, and other forms of capital allocation can be created, too. On this point, I follow legal scholar Sanjukta Paul's argument about the law as an "allocator of coordination rights" (Paul, 2020); she was considering the context of antitrust law and labor rights, but I have extended her concept to understand how financial regulation serves as an allocator of coordination rights for the development and commercialization of technologies. When we recognize the role that policy plays in organizing the means of capital access, we can begin to see levers for how to design other modes that would better serve the common good.

The theory of change I have relied on comes from thinkers who have recognized transformative possibilities in even seemingly humble forms of collective action. Soon before his too-early passing, I had the chance to participate in one of sociologist Erik Olin Wright's "real utopias" seminars—in this case, on cooperatives in Italy. His approach to building an ambitious political program grounded in

community-scale experiments (Wright, 2010) has since continued to motivate my interest in studying and documenting those experiments. André Gorz's concept of "non-reformist reforms" (Gorz, 1968) further informs how I see the value of seemingly modest tactics aligned toward order-upending possibilities. I also ground my thinking in the lineage of the Trinidadian journalist, historian, and organizer C. L. R. James (James, 1956, 1938/1989; James et al., 1958/1974), to his sometime collaborators Grace Lee and Jimmy Boggs (G. Boggs, 1998/2016; J. Boggs & Boggs, 1974; King, 2017), through Grace Lee Boggs's disciple the movement facilitator and writer adrienne maree brown (brown, 2017). Each in their way, these thinkers and activists regarded social change as something that cannot be planned or known in advance but must proceed through collective processes through which participants continually discover what they are capable of. And connective media are crucial to that process.

I further have joined those who see the design of online economies as an important dimension of "digital colonialism," an emerging diagnosis of domination and control through digital networks (Ali, 2016; Avila, 2020; Couldry & Mejias, 2019). There are risks in this line of thinking—particularly the risk of extending the meaning of colonialism too far and reducing it to a mere metaphor (Tuck & Yang, 2012). It is essential to trace the continuities between digital colonialism and the forcible conquest of land, culture, and communities. I often return, for instance, to Silvia Federici's (2004) account of enclosure, witch-hunts, and colonization as a lens for the capture of data and the disciplining of resistance in online spaces. Both are forms of the "primitive accumulation" that capitalism requires to take hold and survive; we can be precise about the structural similarities while also recognizing the differences between the conquest of land and the capture of data. In drawing such connections carefully, one can see more clearly the extractive dimensions of the online economy. Earlier anticolonial struggles, in the process, become a resource to learn from in efforts to build solidarity around movements for a healthier kind of digital economy.

Anticolonial thinking has increasingly taken a speculative turn—employing fiction, fabulation, and imagination to pierce through the veil that hides the possibilities in negative space (Benjamin, 2024; P. Butler, 2021; Hartman, 2008; Imarisha, 2018). This turn represents a contestation around whose voices are usually included in public images of the future, as well as a recognition that the archives we have of the past privilege some kinds if experience over others. To hold agency in the present involves having vivid resources to call upon from the past and the future. These assert the impermanence of economic and political arrangements that may seem unshakable, from the model of venture capital as the means of financing tech innovation to the assumption that data extraction is the proper business model for communications technologies.

Media studies has an opportunity to play a guiding and affirming role, informing speculative imaginations with a deeper understanding of the reigning political economy. Media scholars can also recognize themselves as already working between the empirical and the speculative.

Mediation and archaeology

As I began acquainting myself with media theory in my newfound academic role, a few works stood out as especially influential guides. John Durham Peters's *The Marvelous Clouds* (2015) served as an example of how theorizing media could be an imaginative dialogue between the past and present, between technology and religious tradition, between metaphor and code. Nick Couldry and Andreas Hepp (2016) similarly helped me see mediation as world-making, far more than a field simply reducible to studying recent technologies and the content they harbor. Years earlier, Ivan Illich (1973) had taught me to see how technologies can constrain human possibilities; Ruha Benjamin (2024) and Tiziana Terranova (2022) show how technology can aid in unlocking imaginative possibilities as well, particularly against the same forms of oppression that technology so often serves to reinforce. I cannot resist assigning Donna Haraway's "Cyborg Manifesto" (1991) year after year, because for a few students at least it seems to do what it did for me: viscerally reveal that just as media shape our lives, media are also malleable and vulnerable to subversion. Couldry and Hepp offer a foundational analysis, while Haraway offers a poetics that extends and deepens their recognition of mediation as, in some respects, a general theory of experience.

Many of my favorite media scholars approach their work primarily as "doing," as Sarah Kember and Joanna Zylinska (2012) put it. They do their thinking in tandem with practice, and that is how I have attempted to approach my theorizing as well. I continually cite and teach Sasha Costanza-Chock's *Design Justice* (2020) for how it so carefully places any such doing in the context of communities. Costanza-Chock chronicles self-delusions among product designers and academic researchers alike when they imagine that a bit of consultation here and there with affected people counts as accountability. But the point isn't just more process. The point is for our work to begin and end with the recognition that, in an unjust world, there is no neutrality. To be involved in thinking and doing alike is already to take sides along the balance of powers. For this reason I do not pretend to be anything but on the side of people working to build a more just and democratic media economy.

At times, however, I confess to opting for the company of machines. An important anchor for my own practice of doing has been media archaeology, particularly through my affiliation with and use of the Media Archaeology Lab at CU Boulder, directed by my colleague Lori Emerson (Kirby & Emerson, 2016). This mode of empirical study and theorizing stresses the continued presence—as a kind of haunting—of past choices in the genealogy and ontology of present technologies (Parikka, 2012; Sengupta, 2021; Skågeby & Rahm, 2018). In the machines we take for granted is a record and remnant of the machines that came before them, and each machine is an amalgam of choices that media archaeology trains us to recognize and reveal. The adjacent field of software studies has helped me recognize, in turn, the design of software as an arena for cultural and aesthetic analysis (Bratton, 2016; Coleman, 2013; Fuller, 2008); software studies is a reasonable descriptor for concepts of mine such as "implicit feudalism" and

"modular politics," which begin from the assumption that software engineering is a political practice, even when the engineers do not regard it as such explicitly. Bringing past choices to light, and presencing them, can help reveal more clearly the choices that lie before us today.

Media archaeology is also an invitation to maintenance and care, both for the technologies and the people who rely on them (Edgerton, 2006; Federici, 2012; Vinsel & Russell, 2020). The care work at the Media Archaeology Lab, led by managing director libi rose striegl, makes this theoretical commitment evident in its daily repairs and reuse. Scholarship, too, is a practice of care, keeping useful ideas alive and applying them to better understanding the baffling present. Media scholarship, in particular, must apply that devotion to preservation and memory against the onslaught of media industries that continually assert the sole relevance of only the latest version, product, or release.

Governance

My most recent work has centered on questions of governance—in particular, the flows of power that run through everyday online life. Many other scholars of media and technology have been interested in questions of governance around the systems they study (Braman, 2006; DeNardis et al., 2020; Gillespie, 2018; Gorwa, 2019). Along with them, I have also taken essential cues from outside the field—especially from Elinor Ostrom's school of common-pool resource management (Bollier & Helfrich, 2015; Ostrom, 1990; Silberman, 2016), as well as from feminist economic thought (Federici, 2004; Power, 2004) and political history (Graeber & Wengrow, 2021; Stasavage, 2020). These help me connect questions of online governance with older patterns in the study of human organization. I also draw heavily from scholarship on social movement governance (Nunes, 2021; Polletta, 2004)—a realm, like online communities, where people have often been especially open to democratic experimentation when given the chance.

One origin point for my interest in governance has been my own social movement work—specifically the reporting that led to my book on Occupy Wall Street (Schneider, 2013). There I saw how online social media enabled activists to spread their messages, but those tools were of little use for longer-term organizing. The in-person experiments in direct democracy that moved me so much in the occupied public squares did not translate online. This is a phenomenon that Zeynep Tufekci (2017) later crystallized in her distinction between the outsized "signal" in comparison to the far less developed political "capacity" of recent protest movements. Seeing this disconnect up close stoked a curiosity: What would it take for online networks to enable the kinds of self-governance that movements for social change need in order to endure, evolve, and flourish?

Too often, scholars of media governance risk excessively reifying the current structures of that governance. They can regard rule by CEO and government regulator as an inevitable or necessary condition. For instance, in one major

work in the field (Gillespie, 2018), the question of more democratic alternatives only arises, and only in the broadest of strokes, in the concluding pages. My work takes off from there. In order to ground explorations of this negative space in reality and rigor, I have relied on governance research far afield from online media. While these sources might seem out of scope or off-topic, accounts of mediation as a persistent feature of human experience say otherwise (Couldry & Hepp, 2016; Peters, 2015). A technological determinist may not see the value for Internet governance in Ostrom's studies of governance around fisheries and irrigation systems. But a richer view of mediation can allow the longer histories of human self-governance to shine light on the negative spaces that could make for more just and equitable governance online.

The community of practice in which I have most deeply explored these questions is Metagov, an online laboratory for digital governance whose board I now chair. We hold weekly seminars and have incubated dozens of collaborations, from writing research papers to standards development and policy-making. There I have learned from more fields related to governance, such as mechanism design, cybernetics, complexity theory, human-computer interaction, and social computing. I find that it is far easier to venture into negative space in community, among people holding each other accountable and keeping each other tied to reality.

Return to religion

My academic training began in religious studies, and each week I participate in CU Boulder's Center for Media, Religion, and Culture, along with leading scholars of religion and media: Nabil Echchaibi, Stewart Hoover, Samira Rajabi, and Deborah Whitehead. I have come to notice the parallels between media studies and religious studies. Both fields risk an over-reliance on critique, for one thing. But both fields also present plentiful opportunities for more constructive work, especially through their openness to interdisciplinary play and their relationships—often rightly tense—with communities of practice.

Religion has not been a central theme of my scholarship in recent years, though it has remained present. I expect that I will find ways to return to religion more as I grow more confident as a media scholar. The seminar has meanwhile served as a community for exploring the intersections of media and religion around such topics as decoloniality, nationalism, poetics, and repair (Glissant, 1990/1997; Harney & Moten, 2013; Quijano, 2007; Sharpe, 2016). I continue to be guided by religion scholars who have integrated media into their work, such as Anthea Butler (2021), Kathryn Lofton (2017), and Jenna Supp-Montgomerie (2021), as well as those who analyze religion as a means of interrogating widely taken-for-granted concepts in our world (Asad, 2003; McLaughlin et al., 2020; Stout, 2004).

Recently, for example, I have been exploring relationships between religious and technological uses of the concept of "protocol," drawing on cases including

monastic orders (Agamben, 2013) and Indigenous traditions (Theriault et al., 2020). The word is commonly used now both for the foundational technologies of networked systems—like TCP/IP, the basic blueprint of the Internet—as well as for the expected behaviors in the context of traditional ceremonies. In this sense, perhaps we should reconsider the dictum that "code is law" (Lessig, 2006) in light of a recognition that protocol is ritual.

Once again, I am drawn to the intersections of the old and the new, of common patterns that recur across diverse contexts. Theories of mediation have enabled me to recognize the malleability of political economy and how much there is still to explore in online governance. Through these insights from work that came before mine, I have sought to make contributions of my own.

Portfolio

For my portfolio, I present my latest book along with essays that articulate core themes informing my current work and potential future directions. Each of these works explores the interplay of media technologies with the flows of social and economic power—toward a recognition that social structures such as corporate law and financial regulation can be usefully theorized as media. Upon recognizing such structures as a species of mediation, I find it becomes possible to see more clearly the forms of social mediation that are not available but could be—which is to say, the territories of negative space.

The essays I have chosen to accompany the monograph are ones that I have found myself repeatedly coming back to—to guide my thinking and to share with others. They also model my preferred method of identifying problems through collaborations with non-academic practitioners and then turning to academic practice to make some progress on those problems. These works have both shaped academic discussions and inspired practitioner strategies. I see them as essential foundations for my future scholarship, conceptually and methodologically.

I have not included any co-authored works here, though such collaboration has been a major part of my academic practice. Co-authorship has enabled me to publish in fields beyond my own, such as in law reviews and computer-science conference proceedings. I am also becoming more intentional about using co-authorship with graduate students at CU Boulder as a pedagogical practice. But for the purposes of this portfolio, I prefer to focus on single-authored work so as to avoid any ambiguity about credit or contribution, as well as to retain focus on my particular intellectual trajectory.

Each work in this portfolio has been a foray into the study of negative space around mediated practices, from everyday online communities to corporate law to the design of globe-spanning protocols, including the Internet itself.

Governable Spaces: Democratic Design for Online Life

The heart of my portfolio is *Governable Spaces*, my fourth single-authored book and first academic monograph. It was published in February 2024, open access, by University of California Press. *Governable Spaces* assembles a sequence of research over about five years on the archaeology, practice, and promise of governance in and around online communities. The basis of each chapter was initially a peer-reviewed paper; as the papers were published, I saw the need to explain to readers how I had begun to see their interconnections. For the book, the material from the papers was significantly rewritten and rearranged in order to help make the through-lines clearer, as well as to reflect advances in my thinking after the papers came out. I also synthesized my own work with ideas developed in co-authored papers.

Governable Spaces begins in the context of software studies and media archaeology, telling a story of how democratic practice has failed to take hold in online communities due to the design pattern of "implicit feudalism." This is the phenomenon by which diverse forms of social media rely on remarkably consistent flows of power, granting absolute and often unchecked authority to a few participants—the admins, moderators, or other privileged accounts. Implicit feudalism began with the earliest digital social media, such as bulletin-board systems and online services, and its logic has become embedded in the products of the world's most powerful companies. Even in highly collaborative practices like open-source software and other kinds of commons-based peer production, recognizably democratic decision making is rare due to the prevailing designs of the underlying tools. What is in some sense most remarkable to me is the willingness of users to tolerate these designs; implicit feudalism has become a culture, one in which we fail to see the negative space of democratic practices that we might otherwise enact together.

I go on to argue that the consequences of implicit feudalism extend far beyond just virtual spaces; it has contributed to the broader story of ascendant authoritarianism around the world. For this I draw on a legacy of political theory that sees the conditions of possibility for democracy in the practice of everyday life—a legacy that includes thinkers such as Alexis de Tocqueville, C. L. R. James, and Robert Putnam. Since so much of people's everyday social lives now runs through online communities, the fate of democracy globally rests, in part, on whether we can practice it in these virtual spaces. When people do turn away from the logic of implicit feudalism, remarkably creative things can happen; to demonstrate this, I draw from case studies including activists seeking alternatives to policing and technologists building blockchain-based economies.

The book then turns to strategies for cultivating more intentionally democratic online lives.

The first strategy, which I refer to as "governable stacks," focuses on the ways in which communities can make their own decisions about technology to increase their capacity to collectively manage their tools. This draws on the long tradition

in anti-colonial movements to center practices of self-governance as a basic practice of resistance. To the extent that many communities today have identified the experience of facing "digital colonialism" and the like, that older tradition may be useful. I point to examples of communities—in particular, ones I have been part of—that have adopted this strategy in their practice.

The second strategy focuses on policy—particularly the public policies of governments, but also the policy written into software and technical protocols. Drawing on feminist economic thought about the need to "provision" for the work of governance, I argue that enabling governable spaces online will require policy infrastructure that better supports collective action and shared ownership. This includes laws that support worker organizing in online contexts as well as financial regulation that privileges capital access for cooperative entrepreneurship. If people can't find the means to organize together or co-own their tools, it stands to reason that those tools won't be built to support self-governance. I point to pre-digital precedents that demonstrate how this kind of policy-making is possible.

By the end of the book, what was initially a fairly modest complaint about software design has become an invitation to a radical reconsideration of basic political categories, including citizenship, sovereignty, and borders. The epilogue suggests that democratic online life could unsettle the monopoly on sovereignty of the nation state and its geographic borders, pointing toward a new paradigm of metagovernance based on networked forms of belonging. This is a point I make only in outline, but it has been provocative enough for me, at least, to motivate much of the work I have been doing since completing the book.

My hope is that *Governable Spaces* will reorient academic and practitioner discussions about the Internet and democracy—from the widespread anxieties about what the Internet is doing *to* democracy toward the question of how to practice democracy in, through, and for the Internet. This reorientation, in turn, invites us into seeing democracy not as just a set of inherited institutions to be defended but as a site of experimentation and exploration in our ever-evolving, everyday online lives.

The book has been out less than a year as of this writing, but I have been gratified to see some early signs that it will have some influence. The week of its publication, the print edition was briefly ranked #2 on Amazon's list of bestsellers in media studies—behind only a book by bell hooks, who is an important conceptual influence on *Governable Spaces*. I did a book tour that included the Brooklyn Public Library, a co-working co-op in Manhattan, a keynote address at a Princeton University workshop for developers of emerging social-media networks, and labor scholars and activists at the University of Toronto. Subsequent events were held at the Internet Archive in San Francisco and the Media Archaeology Lab at CU Boulder. I have discussed the book on a growing number of podcasts with largely non-academic audiences. My hope is that, with time, *Governable Spaces* will invite readers into doing their own scholarship and practice on the design of online community governance.

"Mediated Ownership: Capital as Media," *Media, Culture & Society* 42, no. 3 (2020)

This article has been an important foundation for me in thinking through the relationship between political economy and media theory. For years I have been engaged in exploring strategies for ownership, financing, and policy related to cooperatives; what does any of it contribute to understandings of media? Here I argue that ownership is itself a kind of media. Whether in the form of company stock, digital tokens, or affective performances, ownership is a malleable medium. Through ownership, people communicate their values and relationships. Against the widespread tendency to reify presently dominant forms of ownership, media theory can frame the recognition that ownership is a concept and practice profoundly vulnerable to reinvention.

The paper proceeds as a dialogue between legal theory—especially that on finance and organizational design—and media theory. Both fields have increasingly recognized their areas of study as forms of social construction, and I highlight the commonalities between them as domains that are pliable to human design and meaning-making, and as domains that structure interpersonal relationships. However, saying something is constructed is not to discount its rigidity. (Skyscrapers are constructed, too.) The sense of reality that law and media project is reinforced through affect—the collective emotional experiences that surround them. Doctrines in corporate life such as "shareholder primacy" can seem as inescapable as, for instance, the core Internet protocols. In both cases, however, these are human constructions not natural laws, subject to renegotiation if we allow ourselves to enter into it. The paper calls for an approach to both law and media that allows us to consider ourselves "artists of ownership."

I keep coming back to this argument as a foundation for my work on both the design of governance in online networks and public policy surrounding enterprise ownership. When we recognize ownership as media, it becomes easier to see the unexplored possibilities that would otherwise be negative space. I refer back to this article to help explain my work for colleagues in media studies, as well as to help me understand for myself what is at stake in what can otherwise seem like lonely endeavors.

"Mediated Ownership" reviews a range of academic disciplines and esoteric concepts. However, I have been gratified to see it have life beyond academic theory. For instance, it has been credited with influencing the development of Variant, an innovative investment fund that focuses on supporting projects that share ownership with their users. That kind of impact was not my initial intention. But I have found it reassuring that, if I keep my research questions grounded in practice, even the most theoretical writing can have non-theoretical uses.

"Digital Kelsoism: Employee Stock Ownership as a Pattern for the Online Economy," in *Reimagining the Governance of Work and Employment*, ed. Dionne Pohler (Cornell University Press, 2020)

As a result of a fellowship I held with Rutgers University's Institute for the Study of Employee Ownership and Profit Sharing, this book chapter surveys the work of the lawyer and public intellectual (and alum of my university) Louis Kelso, who developed the Employee Stock Ownership Plan (ESOP). Thanks to his efforts, millions of Americans were able to become co-owners of the companies where they work. I assess the relevance of his ideas to the digital economy, which was still nascent at the time of his death. I argue that Kelso's ideas, as well as his successful political strategies, are instructive for formulating a vision for a more democratic online economy.

The article introduces Kelso's expansive vision for a democratic economy based on widespread ownership of key assets, from businesses to infrastructure. The ESOP was only one of many strategies he proposed; in fact, in his final book, he referred to it as a "Trojan horse" for the wider vision. He and his collaborators also proposed strategies for enabling consumer ownership of businesses, citizen ownership of public works, more widespread ownership of public equities, a new approach to financing home ownership, and more. Whereas the ESOP has not been a major part of the Internet startup industry—stock *options* are far more conducive to the dominant venture capital investment model—some of Kelso's other strategies might be far more appropriate. For instance, a path for consumer ownership might enable users to co-own online platforms they rely on. For all Kelso's proposals, the uniting thread was the principle of enabling ordinary people to access the tools of finance that are normally just available to the rich. He proposed a series of policy techniques that could enable less-capitalized people to gain ownership wherever they create value in the economy.

Kelso's legacy is a remarkable example of thinking in negative space. The fact that his ESOP proved to be the single most successful method for converting US workers into owners demonstrates that what once was negative space can become normal—especially with appropriate policy tools. He was an especially successful "artist of ownership." And I think his unfinished ideas could be especially appropriate for addressing the deep social conundrums of the online economy.

The research represented here informed the concept of "exit to community" (E2C), which I introduced in 2019, and which has since been adopted by a number of tech startups and other organizations (see `e2c.how`). It is an attempt to venture creatively into negative space, inviting other scholars and practitioners into possibilities that are not part of the mainstream discourse but could be. In advancing the E2C concept, I have attempted to follow the model of not just Kelso's ideas but also his implementation strategies. I later developed E2C in a zine, a co-authored law review article, a community of practice, a library of case

studies, and ongoing, hands-on work with entrepreneurs.

As I now look toward doing more policy research and advocacy, I continue to regard Kelso's legacy as an instructive model. I expect that a major focus of the coming years for me will be policy work to facilitate the formation and financing of mutualist ownership in the digital economy and beyond. In my writings and talks for the cooperative movement—I am regularly asked to speak to industry associations in that context—I have stressed the need to operate at a level of ambition comparable to that of Kelso.

"Decentralization: An Incomplete Ambition," *Journal of Cultural Economy* 12, no. 4 (2019)

A recurring calling I have found in my work is to interrogate vernacular concepts. My goal is not to replace them with finely tuned academic terms but to help people with a stake in a concept to see behind and around it. With this paper, I took on the concept of *decentralization* widely used in various Internet-adjacent discourses, most recently the cultures surrounding blockchains. I present a historical genealogy of the concept across political science and Internet culture, in each domain probing its limits. But I do not stop with critique or an acknowledgment of complexity.

Once again, this paper is a dialogue among distinct fields. When reviewing the discourses of decentralization in political science, Internet history, and blockchain subcultures, I find some common patterns—particularly, the phenomenon that attempts at decentralization repeatedly seem to produce unexpected forms of centralization. Decentralizing political systems, for instance, frequently enables the growth of power among corporations or warlords; the Internet, meanwhile, has seen its decentralized technical protocols captured in many respects by the economic power of corporations. With blockchains, each step toward decentralization (e.g., a permissionless ledger co-governed by diverse agents) seems to come at the cost of profoundly centralized dynamics (e.g., a single ledger; charismatic authority of founders). Why does this so consistently seem to happen?

What emerged most saliently from this paper was the recognition that decentralization in system design is actually part of a conceptual binary. This helps explain why it repeatedly seems to emerge in integral relationship with centralized phenomena. When system designers focus only on achieving decentralization, unanticipated—and often unwelcome—forms of centralized power tend to emerge.

The upshot is an insight that I have frequently shared with system designers when they seek my advice for their practical adventures in negative space: To protect decentralized systems, there should also be intentional forms of centralized power that are accountable to participants. What began as a project of intellectual curiosity developed into a piece of practical advice. The paper continues to be circulated and discussed, and recently it reached over one hundred citations. It was one of my first peer-reviewed publications, but I expect it may be one of the most enduring.

Throughlines

This portfolio is an assertion that better kinds of mediated orders are possible—and within reach. Online platforms could be designed to support the practice of everyday democracy, but they aren't. The startup economy could have been designed around mutualist ownership and power, but it wasn't. No single design or redesign is determinative, as forces from elsewhere so often absorb it into their own logics. But scholarship, and the truth-telling it enables, can serve a coordinating function. When negative space becomes visible, people can organize at multiple levels to enter it and fill it in. I hope my work can provide, in that sense, a beacon.

Methods in practice

I have long wrestled with my methodological identity. When I was just beginning to come into my own as a journalist, I was interviewed live on a major public radio show in New York about my coverage of the then-ongoing Occupy Wall Street protests. The interview began with an interrogation: *What are you, a journalist or a protester?* That was not an easy question to answer, given that my journalistic method (and the tug of my conscience) had been to embed myself among the people I wanted to understand. In the moment I hesitated and stumbled. But afterward I turned to my mentors, who helped me find confidence in what I was doing, even if it didn't fit within a certain methodological taxonomy. By the time I published a book on Occupy, I used *The New York Observer*'s critique of my methods as a badge of honor on the cover: "Objective journalism, this is not."

As a scholar, I have continued my journalistic preference for engagement over distance. I often admire scholarship that emphasizes statistical methods and rigorous distinctions between researcher and subject. I learn from that work and use it in my own. But I do not find that it is well suited, in the end, for the study of negative space. With distance, research becomes constrained to the detectable, to what is—and rightly so. But when one is closer to the field of study, and enmeshed in it, one can see more clearly the discrepancies between the aspirations of participants and what they find to be possible. One can see up close the barriers that prevent them from doing otherwise. The stakes of theory become viscerally clear when one is invested in what the theory addresses.

People sometimes still introduce me in public events as a journalist. When I hear that, it strikes me that I no longer identify that way to myself. I do not move around the world with a notebook always in my pocket like I used to; my work is far more often subject to peer review by academic colleagues than to fact-checking by the staff of a magazine. I track the uptake of my ideas less by short-term social-media reactions than longer-term citation counts. I no longer feel the need to explain what kind of journalist I am. But I do feel the importance of explaining my practice in academic terms, above all to ensure

that the stories and experiences people share with me have the credibility they deserve when I share them in turn.

This section will introduce some of the thinking that informs my scholarly practice, as well as some examples of how this thinking has manifested in my work. The examples will inform reflections in the next section on future methodological directions.

Starting points for research

My approach to scholarship falls broadly in the territory of participant observation and, more precisely, participatory action research (Cornish et al., 2023). In this I am especially influenced by the framework of design justice as outlined by Sasha Costanza-Chock (2020), who recognizes the need for research in processes of design while rejecting any pretense to neutrality in a non-neutral, unjust world. Costanza-Chock also argues for research that occurs within and among the communities it serves, not *for* them from the outside. In this sense, I think of the heart of my method as the crafting of accountability. When we know to whom and what we are accountable, methodological choices emerge accordingly.

Many of my recent publications rely on qualitative case studies (Baxter & Jack, 2015) to ground theory-building in empirical experience. At times I have also utilized autoethnography (Hughes & Pennington, 2016), particularly when my own engagement in a field of study is the most honest and appropriate basis for my theorizing. My contributions seem to come most often not from the analysis of a single case but from a synthetic comparison across multiple domains of scholarship and activity. I do not purport to perform a scientific method of hypothesis, experimentation, and conclusion. I more often regard empirical material as illustrative in a research process that is inductive and intuitive, while also open to deductive reason (Locke, 2007). I recognize there are limitations to this kind of method, and I am grateful that other scholars use other methods. But particularly for the elucidation of negative space, I think a more inductive approach is indispensable.

In support of these approaches, I still rely on a practice of interviewing much like what I did as a journalist. Rather than seeking generalizable findings by asking the same questions of many informants, I rely on tailored conversations with people who hold unique roles and perspectives; given their uniqueness, my informants typically opt to be referred to by name in the publication, as opposed to anonymity or pseudoanonymity. These kinds of interviews have been the basis of many of my case studies (Martins Rodrigues & Schneider, 2022; Schneider, 2020a, 2022b), enabling me to present stories of attempts to enter into negative spaces and make new things real.

Additionally, my publications have relied heavily on more "armchair" methods such as policy analysis (Mannan & Schneider, 2021; Schneider, 2021; Vaheesan & Schneider, 2019) and primary-source historical investigations (Schneider, 2019, 2020a, 2022c, 2022a). From the framing of research questions to the initial drafts

I send for feedback, I ground these kinds of projects in the experience of people attempting to bring about social change. An important part of my method, therefore, is the maintenance of relationship. Nearly every day, I meet with old acquaintances or new ones outside of academia, comparing notes on our ongoing projects and identifying points of intersection.

For example, for a study of employee ownership in journalism (Schneider, 2020a), I took my initial motivation from my role as an advisor to a nascent journalist-owned news organization, my founding role in a worker-self-directed news platform, and what seemed among my acquaintances like a growing interest among journalists in worker cooperatives. The study began with a survey of the secondary literature, much of which was out of date. I then turned to contemporary news reports and business records to understand the status of older cases and to identify new ones. I conducted interviews with participants in cases that were not well documented. All along, I maintained data on each case, which later became the basis of a database for industry activists advocating for worker power.

The relationship-based, inductive methods I use admittedly lend themselves to distortions of positionality. Networks of relationship are deeply shaped by privilege and power. My role in academia provides me with access to informants others might not be able to reach; at the same time, my identity and role can prevent me from hearing voices I should be hearing. I cannot claim to have solutions for this problem, except to say that I ask myself about it frequently, and I seek to surround myself with archives, literatures, and relationships that compel me to look beyond my own perspective. I try to be attentive to whom I cite and build my ideas with. I also trust, above all, that my research practices fit within a broader academic picture, and they are just a small part of a much larger project of knowledge building.

To give an example of how I think my methods fit within a broader scholarly enterprise, consider the recent book *Behind the Startup* by Benjamin Shestakovsky (2024). It is the product of an unusually embedded form of participant observation, wherein the scholar ended up becoming a managerial-level employee of the tech startup he was studying (where he began as an intern). He felt the pressures of venture capital investment firsthand, enabling him to understand its logic in ways more visceral than might be apparent from externally accessible data. As I did with Occupy, he embraces involvement and integration as a means of ethnographic data-gathering; however, he limits his conclusions to what appears in that data. At the end of the book, where Shestakovsky begins to imagine alternatives to the system he has so meticulously studied, he turns to my work among others—for he needs methods beyond his own to map the possibilities in negative space. This is how I hope I can continue to fill gaps in other methodological approaches.

Much of my output has been theoretical and conceptual in nature, but I see the purpose of it as being to inform practices of making—whether of technologies, social organizations, or public policy. In this, again, I follow Sarah Kember and

Joanna Zylinska (2012) in their call for "creative mediation" as a way of "doing media studies."

Making as method

In between the major chapters of *Governable Spaces*, there are two-page spreads that highlight experimental projects that I was engaged in while developing the ideas in the book. These are examples of what "doing media studies" has meant to me. They include, for instance, two software development projects I led through my lab: CommunityRule, a Web app that provides an interface for developing simple bylaws (Schneider, 2020b), and Modpol, a mod that enables diverse governance processes in an online multiplayer game (Schneider & Miller, 2022). I make no claim to excellence as a software developer, but to me these prototypes serve an important role in testing my ideas in code that has to run and real users. I follow in the footsteps of academic projects like Turkopticon (Irani & Silberman, 2016) and PublicSpaces (Bogaerts et al., 2023) that produce usable technology to meaningfully fill negative space.

With CommunityRule, I have gotten to see how strangers have adopted the platform in ways I never expected, and what they do continues to steer its development. I initially designed the tool through workshops with mutual-aid groups and open-source software communities. Their insights helped frame my theoretical work on community governance. With Modpol, I experienced the challenge of implementing my theories in software; several times we had to rewrite code when we realized how we had been unknowingly clinging to precisely the kinds of assumptions we had been trying to escape. Too often, I think, media scholars criticize existing systems or propose different ones without having to take seriously the challenges that arise in implementation. Facing these challenges myself serves as a kind of accountability for my inductive speculations.

In addition to code, I have honed my ideas through organizational practice. During my academic career I have served on the boards of several organizations related to my research. I recently succeeded legal scholar Lawrence Lessig as the board chair of Metagov, a network for research and experimentation on online governance. These roles have helped me experience firsthand, for instance, the barriers to capital access for co-ops today and the dynamics of governance in large online communities. In the process, I have found questions to explore in research and practitioners who help me ensure that my research is useful. I think of *Governable Spaces* as, in some respects, a tribute to the community I have found in Metagov and an attempt to explain why I believe our work together is so important.

A further form of action research I have consistently attempted is the development of community databases—artifacts intended chiefly to serve practitioner needs. In some cases, these projects have become academic contributions as well. Shortly after co-organizing the first platform cooperativism conference at the New School in 2015, I created the Internet of Ownership, an online database of projects

in that growing movement. I published about it myself (Schneider, 2018a), and other scholars have used the database in their own research on the topic (Puranen, 2019; Sandoval, 2020). As I became more involved in the Colorado co-op community, I also built a database of co-ops in the state to support fellow activists. The challenges of formulating usable taxonomies in these efforts have helped me see more clearly certain conceptual misconceptions. For instance, the challenge of clearly distinguishing platform cooperatives from other entities in a database inclined me to stop relying as heavily on that term as I once did.

The work behind *Governable Spaces* was informed by several other community databases. These include Govbase, an early project at Metagov cataloging existing forms of online self-governance, and Democratic Mediums, a collection of governance primitives that became the basis of the CommunityRule platform. Currently, I am working with political scientist Federica Carugati and others to build Governance Arachaeology, a collection of historical self-governance practices from diverse societies around the world (Carugati & Schneider, 2023). We began that project by hosting an artist residency, which informed our thinking and resulted in an exhibition at the UN Internet Governance Forum.

While databases often exemplify the kind of academic work that is inaccessible to the outside world, I have always designed my database experiments with practitioner needs as the first priority. Publishable research findings frequently arise in the process, but those are outgrowths of an inquiry that began elsewhere, and whose initial accountability lies elsewhere.

A final form my scholarly methodology takes is in my more personal practice. For years I have cultivated intentional relationships with computing technologies through a practice that I (and then others) have called "slow computing" (Kitchin & Fraser, 2020; Schneider, 2015). This involves relying heavily on community-developed software, buying used or fair-trade hardware, developing a relationship with a local computer manufacturer, using old technology wherever possible (Maxigas & Latzko-Toth, 2020), and participating in cooperatively owned cloud services. Despite their occasional nuisance, I enjoy these experiments, and in the process they inform my studies of negative space by pushing the boundaries of the possible toward what perhaps should be more normal. In my lab, I expect my students to adopt some of these habits, too, as a pedagogical practice (Brennan & Schneider, 2024). Even in these small ways, we should seek to allow our scholarship to change our everyday lives.

That is what I might say now to the radio host, if I had the chance to answer again: I want to allow research to change me and my sense of what is possible, whether the subject is a social movement or an emerging technology. My choices of method begin not in the abstract, but they flow from the intentional crafting of my own accountability.

Contributions, limitations, and future work

The study of negative space requires noticing ruptures in the prevailing way of things, then probing them persistently until they become portals into other possible worlds. I have sought to do this work in my time so far as a media scholar and in the works presented here.

Governable Spaces begins with observing an obvious and ubiquitous pattern in the design of online spaces, then unearths its origins and consequences. I have persisted in being curious about blockchains, despite all the reasons I would prefer to turn away, because they represent a world in microcosm that operates according to an distinct set of rules. I have been fascinated by legacy of cooperative ownership because it similarly stands in contrast to an economy dominated by investor-ownership. The contradictions that these sites provoke can help us see what might be lurking in the negative spaces we would otherwise fail to notice, the alternate universes that may not be so far from ours.

I believe I have been able to make meaningful contributions through works such as these. In the study of the politics and economy of online platforms, I have highlighted needs and opportunities for more democratic design practices. Concepts I have introduced, such as "implicit feudalism" and "exit to community," have added to the language available for mapping and entering this sort of negative space. Citations of these concepts are becoming increasingly widespread in a variety of academic fields. "Platform cooperativism," which I contributed to early on following its coining by Trebor Scholz, has become a growing field of inquiry and research. Through these concepts, I believe I have expanded the imaginative repertoire for scholarship on the possibilities of a more just media economy.

Citation patterns

My most widely cited work in the academic literature, I think tellingly, is the non-academic book I co-edited with Scholz, *Ours to Hack and to Own* (Scholz & Schneider, 2016). Based on a 2015 conference we organized at the New School, the book collects short essays on economic democracy in the online economy from both leading scholars (such as Yochai Benkler, Saskia Sassen, and Juliet Schor) and activists (such as Ra Criscitiello, Caroline Woolard, and Astra Taylor). It is an example of how I seek to cultivate spaces that cross lines between the academy and wider domains of thought and practice. As of this writing, the book has over 500 citations on Google Scholar. In comparison, an academic paper I wrote on the topic of platform cooperativism for the *Sociological Review*, has received around 130 citations. My trade book *Everything for Everyone* (Schneider, 2018b), in turn, has been cited about 90 times. The lines are porous between academia and other domains, and sometimes the most valuable way to contribute to even the academic discourse is to publish outside of academic strictures.

The discourse around platform cooperativism that Scholz and I started has continued to remain alive and well. The term returns almost 3,000 results in Google Scholar, including over 500 since 2023. I am proud to have contributed not just to well-cited publications but to opening a wide door for other researchers to enter and explore. That, to me, matters more than attention on my own work.

Other works that have been widely cited reflect the range of interests I have explored in my career. My second-most cited publication is *Thank You, Anarchy*, my book of reportage on Occupy Wall Street, with around 130 citations (Schneider, 2013). After that is the article "Decentralization: An Incomplete Ambition," which is included in this portfolio. Some of my most-cited works also include magazine articles I published while working as a journalist, including in venues such as *The Nation*, *The Guardian*, and *Harper's*. Although I am not a legal scholar, I am glad to see that the two law review articles I have co-authored (Mannan & Schneider, 2021; Vaheesan & Schneider, 2019) are gaining traction as well.

I am grateful to see that *Governable Spaces*, and the articles that feed into it, are beginning to gain recognition. The book has not yet been out for a year as of this writing, and it has just 15 citations so far. But the *New Media & Society* article that articulates the concept of implicit feudalism (Schneider, 2022a) has over 60 citations in just a few years; the paper on "modular politics" (Schneider et al., 2021)—the founding collaboration for the organization Metagov, as well as an important building block for the book—has over 60. I suspect that soon the momentum evident in these articles will translate into uptake for the book.

More than citation numbers, once again, I hope that the ideas developed in this portfolio will lay groundwork that other scholars can creatively build on. The answer will only become clear in the years to come.

Serving practitioners

In addition to the scholarship this work has helped to advance, and perhaps to a greater degree, my work has shaped the thinking of practitioners. Platform cooperativism has become an umbrella concept for hundreds of projects, including individual co-op businesses and support organizations. The inaugural conference on the topic attracted over one thousand people, many of whom were practitioners. That occurred during my first months in the Department of Media Studies at CU Boulder, and it set in motion much of my work in the field. Still today, most weeks I have at least one meeting with platform co-op founders looking for advice on building their projects. Much of my research has begun in those conversations, as I have sought to develop strategies, concepts, and insights that can help it easier for them to build democratic platforms in a world far more designed around investor control.

I published my book *Everything for Everyone* (2018b) with a nonprofit imprint of Hachette, one of the major international trade publishers. It chronicled my

reporting and research around platform cooperativism and has served as an introduction for both scholars and practitioners to the cooperative movement. Following the publication of the book, I co-founded a first-of-its-kind accelerator for new cooperatives, Start.coop, on whose board I still serve. We have supported dozens of founders in taking on major social challenges through co-ops, with a strong emphasis on economic and racial justice.

One pattern I observed in my ongoing conversations with startup leaders was that there were many people interested in cooperative-like models for whom a formal co-op would not be an option. This included projects that were already far enough along that they were locked into a particular legal structure, or projects that needed some kind of hybrid structure. Often, founders simply weren't sure what the right kind of ownership design would be because they were still seeking out product-market fit. It was from these kinds of experiences that I developed the concept of "exit to community" (E2C), a narrative strategy for startups that saw community ownership as a destination but not necessarily the starting point.

At the time, I was on a fellowship with the Open Society Foundations, which at the time was investing in emerging strategies for shared ownership as a means of advancing economic inclusion. I first presented the idea as an invited speaker at a TED-like event in São Paulo, Brazil, and then again at ETHDenver, the largest ongoing Ethereum conference in the United States (which is structured as a cooperative, thanks to the founder's chance attendance at a talk of mine). Ethereum founder Vitalik Buterin, who spoke just after me that day, began advocating E2C, and the concept took hold in the blockchain ecosystem. All this was before the first academic paper on the topic was published (Mannan & Schneider, 2021); my co-author and I opted for a law review as the venue in the hopes of spurring the legal innovation necessary to make E2C options more widely available.

Governable Spaces is similarly anchored in an ethic of service to practitioners. The central ideas emerged through my conversations with and experience among cooperative projects. And despite being an academic monograph, the audience has once again been primarily among practitioners. Book events were hosted at the Brooklyn Public Library and the Internet Archive. When I was invited to give the keynote address at a Princeton University conference during my initial tour, it was for a mixed audience of scholars and practitioners working around the emerging "decentralized social media" networks. Once again, because of the book and my leadership role in the research community Metagov, I am frequently in touch with practitioners looking for guidance on building more democratic designs for their software and online communities.

I remain eager to ensure that my future scholarship is somehow of use to people attempting to build a more equitable and democratic media economy. I continue leadership roles at Start.coop and Metagov. I continue writing for popular publications as well as academic journals, and a maintain a role as a Contributing Writer at *America*, a national Catholic magazine published by the

Jesuits. The purpose of academic work, in my view, should not be simply to do the bidding of the private sector, so I would not want my efforts to be reducible to that. But I do hope to meaningfully contribute to a media economy in which "it is easier to be good," as the poet-activist Peter Maurin used to say (Day, 1952/2017).

Limitations

There are several important limitations that I recognize in my work. For instance, my unusual professional journey did not leave me with a standard academic methodology, such as ethnography, statistical analysis, or discourse analysis. I did develop a certain immersive practice as a journalist, but to call work "journalistic" is typically not meant as a compliment in academia. (I believe this stems from a misunderstanding of journalistic standards.) I also suspect my work could benefit from greater reflexivity about my own positionality and identity; I have yet to ascertain, however, how best to do so without actually reinforcing the injustices I would want to reverse (Gani & Khan, 2024). Further, I continually feel the limitations that accrue from being largely monolingual; despite having studied several languages other than English, I do not command any of them sufficiently to study or write. I may make progress on some of these limitations in my career, while others may remain endemic.

Like any scholar, I build on the contributions of others, but I am anxious to contribute back in a fashion commensurate with what I have learned. I fear that the synthetic, speculative nature of negative space means that, while I draw heavily from meticulous, empirical studies of the world as it is my work risks not reciprocating that rigor. The participatory nature of my approach similarly comes at the cost of certain forms of standards that others hold themselves to; while I am proud of what I have contributed, I remain deeply aware of how it is only possible thanks to the contributions of others using very different methodologies.

Strategically—in the sense of bringing desirable negative spaces into being in the world—I have seen the limits of focusing entirely on the speculative and possible at the expense of the real. For instance, after the early years of platform cooperativism, I perceived a crisis in the budding movement; we had focused so much on articulating the possibility of a cooperative Internet that leaders like me failed to sufficiently understand and communicate the real barriers that people would face in implementing it. A large portion of the entrepreneurial experiments, which often involved people risking their livelihoods and reputations, failed to gain lasting traction. In effect, those of us with less on the line had over-promised. I came out of that experience, first of all, much more cautious about publicizing ideas that had not been sufficiently tested and proven. I also learned that the study of negative space must involve a sober reckoning with the barriers often keeping negative spaces from being habitable. Once again, the serious study of negative space depends on payoff careful attention to what is.

Perhaps the most challenging limitation I find in my academic work is the recognition that my accountability has drifted. When most of my waking life involves classroom teaching, faculty meetings, grant administration, student mentorship, a perpetual barrage of email, and writing for the eccentricities of academic venues—not to mention parenting school-age kids when I get home—I have found if more difficult to commit myself to communities outside my immediate orbit. My academic role has also situated me in an affluent city that often seems, if deceptively, set apart from the struggles for justice and even survival that I hope my work will support. In my case, academic achievement risks distancing me from the accountability that is my grounding motivation and guide. As I move into the next phase of my career, I realize I have to make more intentional choices to hold my accountability where it should be. I do not yet know exactly how to do that.

Practices in the making

I look forward to further developing my academic craft in the years to come.

One area that I have begun exploring is the use of speculative fiction as a method. Across many forms of academic practice there appears to be growing interest in this, from economics (Davies, 2018) to ethnography (Forlano, 2013). I have been particularly influenced by work in Black studies, feminist thought, and adjacent discourses that see fiction—and adjacent poetics—as a liberatory practice (brown & Imarisha, 2015; P. Butler, 2021; Glissant, 1990/1997). For the past year I have experimented with writing short fictions—something I did avidly two decades ago but have neglected since. I do so with a sense of anxiety that fiction opens one to the risk of simply "making stuff up," unaccountable to reality. On the other hand, I find this could be a uniquely appropriate method for exploring the terrains and possibilities of negative space. To develop my thinking on fiction in the context of scholarship, for thr Fall of 2024 I developed a version of my department's Future Histories of Technology course structured as a fiction writing-and-making workshop.

Alongside the practice of fiction I am exploring oral history (Perks & Thomson, 2015; Thompson & Bornat, 2017) as part of my research practice. This, like my past work with practitioner databases, is a way of developing both usable artifacts for the commons and foundations for theoretical synthesis in more academic contexts. Oral history fits well with my journalistic background as an interviewer and profiler of people with stories that deserve to be more widely heard. As primarily narrative, personality-driven documents, I see oral histories as a fitting companion to explorations in fiction. It is also a way of addressing some of my concerns about fiction by better grounding my thinking in the lived experience of informants.

I further hope to develop my software experiments, particularly toward creating experiences that are more inviting and accessible for users. Recent efforts such as CommunityRule and Modpol have been useful from a research perspective

but have yet to gain widespread or sustained traction among users. I do not expect my lab to turn into a software development company, but I do think the test of adoption is a valuable signal about the contours of negative space and whether one has usefully filled it. Toward that end, I continue to work on raising funds to support more ambitious versions of these projects.

A growing area of focus in recent years has been co-authoring scholarly articles and book chapters with our graduate students. As a department inclined toward humanistic methods, we have historically privileged single-author publications, which I believe still have their role. However, I have found co-authoring a rewarding way to help students get into the habits of research and publication, as well as to develop my own thinking. In addition to the practitioner-centered collaborations and publications in my lab, I would like to design our programs more intentionally to include more formal publications as a form of production and pedagogy. Currently most of my works in progress are co-authored, both with our students and more junior scholars elsewhere.

Finally, I hope to continue an inquiry that has fascinated me since my time as a journalist: honing the craft of asking questions. When I made my living in large part by interviewing, I developed a special admiration for people who seemed to ask questions in ways I would never think to do. I came to recognize curiosity and question-asking as a skill that one can cultivate. This skill is fundamental to the study of negative space in the context of emerging media. What are the possibilities that most people do not bother to notice or imagine? What assumptions do we take for granted but that should be subject to deeper questioning? The pace of innovation—or apparent innovation—so often lures us into neglecting to ask how things might be otherwise. I find my scholarly vocation in persisting with asking those questions nonetheless.

References

Agamben, G. (2013). *The Highest Poverty: Monastic Rules and Form-of-Life*. Stanford University Press.

Ali, S. M. (2016). A brief introduction to decolonial computing. *XRDS: Crossroads, The ACM Magazine for Students*, *22*(4), 16–21. https://doi.org/10.1145/2930886

Asad, T. (2003). *Formations of the Secular: Christianity, Islam, Modernity*. Stanford University Press.

Avila, R. (2020). Against Digital Colonialism. In *Platforming Equality: Policy challenges for the digital economy*. Autonomy. https://autonomy.work/portfolio/platformingequality/

Barbrook, R., & Cameron, A. (1996). The Californian Ideology. *Science as Culture*, *6*(1). https://doi.org/10.1080/09505439609526455 (Original work published 1995)

Baxter, P., & Jack, S. (2015). Qualitative Case Study Methodology: Study Design and Implementation for Novice Researchers. *The Qualitative Report*.

https://doi.org/10.46743/2160-3715/2008.1573

Benjamin, R. (2024). *Imagination: A Manifesto.* W. W. Norton.

Bernthal, B. (2019). The Evolution of Entrepreneurial Finance: A New Typology. *BYU Law Review, 2018*, 773.

Bogaerts, G.-J., Van Dijck, J., & Zuckerman, E. (2023). Creating PublicSpaces. *Digital Government: Research and Practice.* https://doi.org/10.1145/3582578

Boggs, G. (2016). *Living for Change* (Reprint Edition). University Of Minnesota Press. (Original work published 1998)

Boggs, J., & Boggs, B., Grace Lee. (1974). *Revolution and Evolution in the Twentieth Century.* Monthly Review Press.

Bollier, D., & Helfrich, S. (2015). *Patterns of Commoning.* Commons Strategy Group and Off the Common Press.

Braman, S. (2006). *Change of State: Information, Policy, and Power.* MIT Press. https://doi.org/10.7551/mitpress/1783.001.0001

Bratton, B. H. (2016). *The Stack: On Software and Sovereignty.* MIT Press.

Brennan, J., & Schneider, N. (2024). Lab Cloud. In D. Wershler, L. Emerson, & J. Parikka (Eds.), *The Lab Book: Situated Practices in Media Studies.* University of Minnesota Press. https://manifold.umn.edu/read/lab-cloud/section/a21b046d-2e1b-4327-ad8b-cee8f404f62b

brown, adrienne maree. (2017). *Emergent Strategy: Shaping Change, Changing Worlds.* AK Press.

brown, adrienne maree, & Imarisha, W. (2015). *Octavia's Brood: Science Fiction Stories from Social Justice Movements.* AK Press.

Butler, A. (2021). *White Evangelical Racism: The Politics of Morality in America.* University of North Carolina Press.

Butler, P. (Ed.). (2021). *Critical Black Futures: Speculative Theories and Explorations.* Palgrave Macmillan. https://link.springer.com/book/10.1007/978-981-15-7880-9

Carugati, F., & Schneider, N. (2023). Governance Archaeology: Research as Ancestry. *Daedalus, 152*(1). https://www.amacad.org/publication/governance-archaeology-research-ancestry

Christensen, C. M. (2006). The Ongoing Process of Building a Theory of Disruption. *Journal of Product Innovation Management, 23*(1), 39–55. https://doi.org/10.1111/j.1540-5885.2005.00180.x

Coleman, E. G. (2013). *Coding Freedom: The Ethics and Aesthetics of Hacking.* Princeton University Press. https://gabriellacoleman.org/Coleman-Coding-Freedom.pdf

Cornish, F., Breton, N., Moreno-Tabarez, U., Delgado, J., Rua, M., de-Graft Aikins, A., & Hodgetts, D. (2023). Participatory action research. *Nature Reviews Methods Primers, 3*(1), 1–14. https://doi.org/10.1038/s43586-023-00214-1

Costanza-Chock, S. (2020). *Design Justice: Community-Led Practices to Build the Worlds We Need.* MIT Press.

Couldry, N., & Hepp, A. (2016). *The Mediated Construction of Reality.* Polity Press.

Couldry, N., & Mejias, U. A. (2019). *The costs of connection: How data is*

colonizing human life and appropriating it for capitalism. Stanford University Press.

Davies, W. (Ed.). (2018). *Economic Science Fictions.* Goldsmiths Press.

Day, D. (2017). *The Long Loneliness: The Autobiography of the Legendary Catholic Social Activist.* HarperOne. (Original work published 1952)

DeNardis, L., Cogburn, D., Levinson, N. S., & Musiani, F. (Eds.). (2020). *Researching Internet Governance: Methods, Frameworks, Futures.* MIT Press. https://doi.org/10.7551/mitpress/12400.001.0001

Edgerton, D. (2006). *The shock of the old: Technology and global history since 1900.* Profile Books.

Federici, S. (2004). *Caliban and the Witch: Women, the Body and Primitive Accumulation.* Autonomedia.

Federici, S. (2012). *Revolution at Point Zero: Housework, Reproduction, and Feminist Struggle.* PM Press.

Feld, B. (2012). *Startup Communities: Building an Entrepreneurial Ecosystem in Your City.* Wiley.

Forlano, L. (2013, September 26). *Ethnographies from the Future: What can ethnographers learn from science fiction and speculative design?* Ethnography Matters. https://ethnographymatters.net/blog/2013/09/26/ethnographies-from-the-future-what-can-ethnographers-learn-from-science-fiction-and-speculative-design/

Fuller, M. (2008). *Software studies: A lexicon.* MIT Press.

Gani, J. K., & Khan, R. M. (2024). Positionality Statements as a Function of Coloniality: Interrogating Reflexive Methodologies. *International Studies Quarterly*, *68*(2), sqae038. https://doi.org/10.1093/isq/sqae038

Gillespie, T. (2018). *Custodians of the Internet: Platforms, Content Moderation, and the Hidden Decisions That Shape Social Media.* Yale University Press.

Glissant, É. (1997). *Poetics of relation* (B. Wing, Trans.). University of Michigan Press. (Original work published 1990)

Gorwa, R. (2019). What is platform governance? *Information, Communication & Society*, *22*(6), 854–871. https://doi.org/10.1080/1369118X.2019.1573914

Gorz, A. (1968). *Strategy for labor: A radical proposal.* Boston: Beacon Press. http://archive.org/details/strategyforlabor00gorz

Graeber, D., & Wengrow, D. (2021). *The Dawn of Everything: A New History of Humanity.* Farrar, Straus and Giroux.

Haraway, D. (1991). A Cyborg Manifesto: Science, Technology, and Socialist-Feminism in the Late Twentieth Century. In *Simians, Cyborgs, and Women: The Reinvention of Nature.* Routledge.

Harney, S., & Moten, F. (2013). *The Undercommons: Fugitive Planning & Black Study.* Minor Compositions.

Hartman, S. (2008). Venus in Two Acts. *Small Axe: A Caribbean Journal of Criticism*, *12*(2), 1–14. https://doi.org/10.1215/-12-2-1

Hepp, A., Schmitz, A., & Schneider, N. (2023). Afterlives of the Californian Ideology: Tech Movements, Pioneer Communities, and Imaginaries of Digital Futures. *International Journal of Communication*, *17*(0). https://ijoc.org/index.php/ijoc/article/view/21405

Hughes, S. A., & Pennington, J. L. (2016). *Autoethnography: Process, Product, and Possibility for Critical Social Research*. SAGE Publications.

Illich, I. (1973). *Tools for conviviality*. Harper & Row.

Imarisha, W. (2018, November 13). *All Organizing is Science Fiction*. UMass Amherst History Department, Amherst, MA. http://archive.org/detail s/podcast_umass-amherst-history-departme_walidah-imarisha-all-organiz_1000423858347

Irani, L. C., & Silberman, M. S. (2016). Stories We Tell About Labor: Turkopti-con and the Trouble with 'Design'. *Proceedings of the 2016 CHI Conference on Human Factors in Computing Systems*, 4573–4586. https://doi.org/10.1 145/2858036.2858592

James, C. L. R. (1956). Every Cook Can Govern. *Correspondence*, *2*(12). https: //www.marxists.org/archive/james-clr/works/1956/06/every-cook.htm

James, C. L. R. (1989). *The Black Jacobins: Toussaint L'Ouverture and the San Domingo Revolution*. Vintage Books. http://archive.org/details/blackj acobins00clrj (Original work published 1938)

James, C. L. R., Lee, G. C., & Chaulieu, P. (1974). *Facing Reality*. Bewick Editions. https://libcom.org/files/James%20-%20Facing%20Reality.pdf (Original work published 1958)

Kember, S., & Zylinska, J. (2012). *Life After New Media: Mediation as a Vital Process*. MIT Press.

King, P. (2017, February). Introduction to Boggs. *E-Flux*, *79*. https://www.e-flux.com/journal/79/94671/introduction-to-boggs/

Kirby, J., & Emerson, L. (2016). As If, or, Using Media Archaeology to Reimagine Past, Present, and Future: An Interview with Lori Emerson. *International Journal of Communication*, *10*. https://ijoc.org/index.php/ijoc/article/view /4764

Kitchin, R., & Fraser, A. (2020). *Slow Computing: Why We Need Balanced Digital Lives*. Policy Press.

Lepore, J. (2014, June 16). What the Gospel of Innovation Gets Wrong. *New Yorker*. https://www.newyorker.com/magazine/2014/06/23/the-disruption-machine

Lessig, L. (2006). *Code* (Version 2.0). Basic Books.

Lincoln, B. (1999). *Theorizing Myth: Narrative, Ideology, and Scholarship*. University of Chicago Press.

Locke, E. A. (2007). The Case for Inductive Theory Building. *Journal of Management*, *33*(6), 867–890. https://doi.org/10.1177/0149206307307636

Lofton, K. (2017). *Consuming Religion*. University of Chicago Press.

Malloy, J. (2016). The Origins of Social Media. In J. Malloy (Ed.), *Social Media Archeology and Poetics*. MIT Press.

Mannan, M., & Schneider, N. (2021). Exit to Community: Strategies for Multi-Stakeholder Ownership in the Platform Economy. *Georgetown Law Technology Review*, *5*(1), 1–71. https://georgetownlawtechreview.org/exit-to-community-strategies-for-multi-stakeholder-ownership-in-the-platform-economy/GLTR-05-2021/

Martins Rodrigues, J., & Schneider, N. (2022). Scaling Co-operatives Through

a Multi-Stakeholder Network: A Case Study in the Colorado Solar Energy Industry. *The Journal of Entrepreneurial and Organizational Diversity*, *10*(2), 29–53. https://doi.org/10.5947/jeod.2021.008

Maxigas, & Latzko-Toth, G. (2020). Trusted commons: Why "old" social media matter. *Internet Policy Review*, *9*(4). https://policyreview.info/articles/analysis/trusted-commons-why-old-social-media-matter

McIlwain, C. D. (2019). *Black Software: The Internet & Racial Justice, from the AfroNet to Black Lives Matter*. Oxford University Press.

McLaughlin, L., Rots, A. P., Thomas, J. B., & Watanabe, C. (2020). Why Scholars of Religion Must Investigate the Corporate Form. *Journal of the American Academy of Religion*. https://doi.org/10.1093/jaarel/lfaa041

Nicholas, T. (2019). *VC: An American History*. Harvard University Press.

Nunes, R. (2021). *Neither Vertical nor Horizontal: A Theory of Political Organization* (p. 320). Verso.

Ostrom, E. (1990). *Governing the Commons: The Evolution of Institutions for Collective Action*. Cambridge University Press.

Parikka, J. (2012). *What is Media Archaeology?* Polity Press.

Paul, S. (2020). Antitrust As Allocator of Coordination Rights. *UCLA Law Review*, *67*(2). https://www.uclalawreview.org/antitrust-as-allocator-of-coordination-rights/

Perks, R., & Thomson, A. (Eds.). (2015). *The Oral History Reader* (3rd ed.). Routledge. https://doi.org/10.4324/9781315671833

Peters, J. D. (2015). *The Marvelous Clouds: Toward a Philosophy of Elemental Media*. University of Chicago Press.

Polletta, F. (2004). *Freedom Is an Endless Meeting: Democracy in American Social Movements* (1st edition). University of Chicago Press.

Power, M. (2004). Social Provisioning as a Starting Point for Feminist Economics. *Feminist Economics*, *10*(3), 3–19. https://doi.org/10.1080/1354570042000267608

Puranen, R. (2019). *Owning the Sharing Economy: Comparing the business models of platform cooperatives and investor owned sharing economy platforms*. https://aaltodoc.aalto.fi/handle/123456789/39109

Quijano, A. (2007). Coloniality and Modernity/Rationality. *Cultural Studies*, *21*(2–3), 168–178. https://doi.org/10.1080/09502380601164353

Rankin, J. L. (2018). *A People's History of Computing in the United States*. Harvard University Press.

Sandoval, M. (2020). Entrepreneurial Activism? Platform Cooperativism Between Subversion and Co-optation. *Critical Sociology*, *46*(6), 801–817. https://doi.org/10.1177/0896920519870577

Schneider, N. (2013). *Thank You, Anarchy: Notes from the Occupy Apocalypse by Nathan Schneider*. University of California Press.

Schneider, N. (2015, May 20). The Joy of Slow Computing. *New Republic*. https://newrepublic.com/article/121832/pleasure-do-it-yourself-slow-computing

Schneider, N. (2018a). An Internet of Ownership: Democratic Design for the Online Economy. *The Sociological Review*, *66*(2), 320–340.

Schneider, N. (2018b). *Everything for Everyone: The Radical Tradition That Is*

Shaping the Next Economy. Nation Books.

Schneider, N. (2019). Decentralization: An Incomplete Ambition. *Journal of Cultural Economy*, *12*(4), 1–21. https://doi.org/10.1080/17530350.2019.1589 553

Schneider, N. (2020a). Broad-Based Stakeholder Ownership in Journalism: Co-ops, ESOPs, Blockchains. *Media Industries*, *7*(2). https://doi.org/10.3998/ mij.15031809.0007.203

Schneider, N. (2020b, October 26). Designing Community Self-Governance with CommunityRule. *Sharing & Cooperativism: Designing For Economies.* NordiCHI. https://mediarxiv.org/dk5tb/

Schneider, N. (2021). Enabling Community-Owned Platforms: A Proposal for a Tech New Deal. In M. Moore & D. Tambini (Eds.), *Regulating Big Tech: Policy Responses to Digital Dominance.* Oxford University Press. https://ntnsndr.in/TechNewDeal

Schneider, N. (2022a). Admins, Mods, and Benevolent Dictators for Life: The Implicit Feudalism of Online Communities. *New Media & Society*, *24*(9), 1965–1985. https://doi.org/10.1177/1461444820986553

Schneider, N. (2022b). *Cryptoeconomics as a Limitation on Governance.* Mirror. https://ntnsndr.mirror.xyz/zO27EOn9P_62jVlautpZD5hHB7ycf3Cfc2N6b yz6DOk

Schneider, N. (2022c). The Tyranny of Openness: What Happened to Peer Production? *Feminist Media Studies*, *22*(6). https://doi.org/10.1080/146807 77.2021.1890183

Schneider, N., De Filippi, P., Frey, S., Tan, J. Z., & Zhang, A. X. (2021). Modular Politics: Toward a Governance Layer for Online Communities. *Proceedings of the ACM on Human-Computer Interaction.* https://dl.acm.org/doi/10.11 45/3449090

Schneider, N., & Miller, L. (2022, January 30). *Modpol is a Self-Governance Toolkit for Communities in Online Worlds.* HackerNoon. https://hackerno on.com/modpol-is-a-self-governance-toolkit-for-communities-in-online-worlds

Scholz, T., & Schneider, N. (2016). *Ours to Hack and to Own: The Rise of Platform Cooperativism, a New Vision for the Future of Work and a Fairer Internet.* OR Books.

Sengupta, R. (2021). Towards a Decolonial Media Archaeology: The Absent Archive of Screenwriting History and the Obsolete Munshi. *Theory, Culture & Society*, *38*(1), 3–26. https://doi.org/10.1177/0263276420930276

Sharpe, C. (2016). *In the Wake: On Blackness and Being.* Duke University Press Books.

Shestakofsky, B. (2024). *Behind the startup: How venture capital shapes work, innovation, and inequality.* University of California Press.

Silberman, M. S. (2016). Reading Elinor Ostrom In Silicon Valley: Exploring Institutional Diversity on the Internet. *Proceedings of the 19th International Conference on Supporting Group Work*, 363–368. https://doi.org/10.1145/29 57276.2957311

Skågeby, J., & Rahm, L. (2018). What is Feminist Media Archaeology? *Com-*

munication 1, *7*(1). https://doi.org/10.7275/fthf-h650

Stasavage, D. (2020). *The Decline and Rise of Democracy: A Global History from Antiquity to Today*. Princeton University Press.

Stout, J. (2004). *Democracy and Tradition*. Princeton University Press.

Supp-Montgomerie, J. (2021). *When the Medium Was the Mission: The Atlantic Telegraph and the Religious Origins of Network Culture*. NYU Press.

Terranova, T. (2022). *After the Internet: Digital Networks between Capital and the Common*. Semiotext(e).

Theriault, N., Leduc, T., Mitchell, A., Rubis, J. M., & Jacobs Gaehowako, N. (2020). Living protocols: Remaking worlds in the face of extinction. *Social & Cultural Geography*, *21*(7), 893–908. https://doi.org/10.1080/14649365.2019.1619821

Thompson, P., & Bornat, J. (2017). *The Voice of the Past: Oral History* (4th ed.). Oxford University Press.

Tuck, E., & Yang, K. W. (2012). Decolonization is not a metaphor. *Decolonization: Indigeneity, Education & Society*, *1*(1), 40.

Tufekci, Z. (2017). *Twitter and Tear Gas: The Power and Fragility of Networked Protest*. Yale University Press.

Turner, F. (2010). *From Counterculture to Cyberculture: Stewart Brand, the Whole Earth Network, and the Rise of Digital Utopianism*. University of Chicago Press.

Vaheesan, S., & Schneider, N. (2019). Cooperative Enterprise as an Antimonopoly Strategy. *Penn State Law Review*, *124*(1), 1–55. http://www.pennstatelawreview.org/print-issues/cooperative-enterprise-as-an-antimonopoly-strategy/

Vinsel, L., & Russell, A. L. (2020). *The Innovation Delusion: How Our Obsession with the New Has Disrupted the Work That Matters Most*. Currency.

Wright, E. O. (2010). *Envisioning Real Utopias*. Verso.